



# Additional Detail Corresponding to Content Specification Outline dated June 14, 2002

# **Effective Upon the Launch of the Computer-based Uniform CPA Examination**

Prepared by the Board of Examiners of the American Institute of Certified Public Accountants

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### Introduction

The computerized Uniform CPA Examination, to begin on April 5, 2004, is a 14-hour exam with four sections. Three sections - Auditing & Attestation, Financial Accounting & Reporting, and Regulation - will include much of the content covered in the current paper-based CPA Examination. The fourth section, Business Environment & Concepts (BEC), is new. This section covers knowledge of the general business environment and business concepts.

The content of the Uniform CPA Examination is based primarily on the results of periodic studies of public accounting practice and the evaluations of CPA practitioners and educators. The content of each examination section is described in a combination of narrative and outline forms known as "content specifications." The content specifications provide the framework or "blueprint" for testing knowledge and skills on the Uniform CPA Examination.

In June 2002, the AICPA Board of Examiners (BOE) approved and adopted content specification outlines (CSOs) for the four sections of the computer-based Uniform CPA Examination, including Business Environment & Concepts. A document containing these outlines is available at the CPA exam web site, www.cpa-exam.org.

The purpose of this paper is to provide greater detail about the BEC section of the revised, computer-based Uniform CPA Examination than is provided in the CSOs. This detail is provided for the BEC section in recognition of the fact that approximately 70% of the content of the section is new material, and not currently tested on the paper-based CPA examination

This paper is intended to provide guidance to candidates preparing for the BEC section of the computerized CPA examination. It is not an exhaustive or all-inclusive listing of all the concepts that could be used to test the groups and topics outlined in the BEC content specification outline.

Also note that since every examination administration represents a sample of the content specifications, not every concept listed in this paper will be tested on every examination.

This paper is organized in four sections.

I — Overview

II — Detail for Content Specification Outline

III —Typical references

IV — Sample questions

# I — Overview

The Business Environment and Concepts section tests

- knowledge of the general business environment and business concepts that candidates
  need to know in order to understand the underlying business reasons for and accounting
  implications of business transactions; and
- the skills needed to apply that knowledge in performing financial statement audit and attestation engagements and other functions normally performed by CPAs that affect the public interest.

The structure and content of this and the entire computerized Uniform CPA Examination is responsive to the findings in the 2000 Practice Analysis of Certified Public Accountants and comments to the exposure draft Proposed Structure and Content Specifications for the Uniform CPA Examination issued by the AICPA Board of Examiners (BOE).

With regard to the Business Environment and Concepts section, the BOE decided that an independent assertion regarding CPA candidates' business knowledge, and the skills necessary to apply that knowledge is necessary for several reasons, including:

- The practice analysis showed that knowledge of business concepts is important to the protection of the public.
- The public often looks to CPAs, including those recently licensed, as business advisers.

Therefore, both the Content Committee and the BOE concluded that entry-level knowledge in this area currently is critical to audit effectiveness and thus the protection of the public. As a

result, the BEC section of the examination will test candidates' understanding of concepts related to business and the business environment, such as economics, information technology, and general business measurement (including management accounting). As is true for the entire CPA Examination, these concepts are tested in the context of entry-level CPA practice.

## II – Detail for Content Specification Outline

### Area I – Business structures (17%-23%)

Group A – Advantages, implications, and constraints of legal structures for business

A CPA examination candidate should be able to:

- Identify the general characteristics of various business forms such as sole proprietorship, partnership (general, limited, limited liability), joint venture, limited liability company, and corporation (Subchapter C, Subchapter S).
- Identify the advantages and disadvantages of various business forms such as sole proprietorship, partnership (general, limited, limited liability), joint venture, limited liability company, and corporation (Subchapter C, Subchapter S).

### Group B – Formation, operation, termination of businesses

The candidate should be able to:

- Determine the recommended business form based on given facts and circumstances
- Identify circumstances indicating when a business should be terminated.
- List the factors supporting a fiscal rather than a calendar year end for both financial reporting and federal taxation purposes.

## <u>Group C – Financial structure, capitalization, profit and loss allocation, and distributions</u>

The candidate should be able to:

- Determine income available for distribution.
- Allocate profits and losses for distribution to owners.
- Identify the characteristics, rights and implications of various capitalization options.

### Group D – Rights, duties, legal obligations, and authority of owners and management

- Differentiate between the rights, duties, legal obligations, and authority of owners (shareholders and partners) and management (directors, officers, and management)
  - o in general terms; and
  - o based on business form

# Area II – Economic concepts essential to understanding the entity's business and industry (8%-12%)

### <u>Group A – Business cycles and reasons for business fluctuations</u>

The candidate should be able to:

- Estimate the effect of economic events on an entity's financial position and business operations.
- Identify the components of the business cycle.
- Recognize circumstances affecting economic business cycles.
- Estimate the effect of the business cycle on an entity's financial position and business operations.

# <u>Group B – Economic measures and reasons for changes in the economy, such as inflation, deflation, and interest rate changes</u>

The candidate should be able to:

- Identify the economic circumstances giving rise to inflation, deflation, expansion, and recession.
- Differentiate between various economic measures such as the Consumer Price Index, Gross Domestic Product, and Gross National Product.
- Differentiate between real, nominal, and effective interest rates.
- Recognize the effect of Federal Reserve Board actions on the national economy

# <u>Group C – Market influences on business strategies, including selling, supply chain, and customer management strategies</u>

The candidate should be able to:

- Estimate the effects of inflation, deflation, expansion and recession on an entity's short-term and long-term financial position and business operations.
- Identify the characteristics of supply chain management.
- Determine the effect on an entity's net income and financial position from changes in supply and demand.
- Recognize the types of differentiation strategies creating a competitive advantage.

# <u>Group D – Implications to business of dealings in foreign currencies, hedging, and exchange rate fluctuations</u>

- Recognize circumstances giving rise to changes in exchange rates.
- Understand the effect of exchange rate fluctuations on financial position and operations.
- Analyze hedging as it relates to foreign currency transactions.
- Understand the purpose of transfer pricing.

### **Area III – Financial management (17%-23%)**

Group A – Financial modeling, including factors such as financial indexes, taxes and opportunity costs, and models such as economic value added, cash flow, net present value, discounted payback, and internal rate of return

### The candidate should be able to:

- Utilize capital budgeting tools such as net present value, internal rate of return, payback method, discounted payback and discounted annual cash flows, including performing calculations.
- Apply capital budgeting tools to make appropriate business decisions.
- Understand financial modeling.
- Calculate the effective interest rate.
- Project periodic cash flows given certain facts and circumstances.
- Recognize the objectives and limitations of capital budgeting tools.

# <u>Group B – Strategies for short and long term financing options, including cost of capital</u> and derivatives

- Identify the advantages and disadvantages of short-term and long-term financing strategies.
- Determine appropriate short- or long-term financing strategies based on given facts and circumstances.
- Differentiate between and determine when appropriate to use different forms of financing such as:
  - Working capital financing
  - Letter of credit
  - Line of credit
  - Leasing options
  - Debentures and bonds
  - Equity financing
- Differentiate between and calculate:
  - o Effective interest rate
  - Stated interest rate
  - o Annual percentage rate
  - Simple interest
  - Compound interest
  - o Effective annual percentage rate
- Calculate weighted-average cost of capital
- Identify and define various business risks, such as:
  - o Interest rate risk
  - Market risk
  - Credit risk
  - o Default risk
- Analyze the trade-offs between risk and return.

### <u>Group C – Financial statement implications of liquid asset management</u>

- Determine cash management techniques appropriate in given circumstances.
- Demonstrate understanding of cash discounts used in credit terms for trade receivables and payables.
- Demonstrate understanding of inventory management techniques, such as just-in-time and economic order quantity.
- Define and identify when appropriate for use:
  - Compensating balances
  - Trade credit
  - Commercial paper
  - o Zero-balance account
  - Electronic funds transfers
  - Lock box system
  - o Official bank checks (a.k.a. depository transfer checks)
- Demonstrate understanding of the implications of fixed and variable loan rates.
- Calculate:
  - o Current or working capital ratio
  - Quick or acid-test ratio
  - Inventory turnover
  - o Return on total assets
  - Debt to equity ratio
  - Debt to total assets ratio
  - Average collection period
  - o Number of days sales in ending trade receivables
  - o Number of days sales in inventory
  - o Gross margin
- Calculate weighted average cost of capital.
- Determine appropriate ratio for analysis given certain facts and circumstances.

# Area IV – Information technology (IT) implications in the business environment (22%-28%)

### <u>Group A – Role of business information systems</u>

The candidate should be able to:

- Understand the role IT plays in financial reporting systems.
- Apply accounting and auditing concepts and standards to transaction processing in an electronic environment.
- Understand the relationship of IT in developing and understanding management reporting systems.
- Identify risks associated with the use of an electronic business information system.

### <u>Group B – Roles and responsibilities within the IT function</u>

The candidate should be able to:

- Understand the roles and responsibilities of system administrators, computer operators, librarians, and system and application programmers.
- Apply the traditional concept of segregation of duties to IT functions.
- Recognize limitations associated with applying traditional concepts of segregation of duties to IT functions.

### Group C – IT fundamentals

- Define and/or characterize basic IT terminology such as:
  - Applications (integrated and stand-alone)
  - Hardware and software
  - Networks
  - o Fourth-generation computer software languages
- Identify advantages of point-of-sale processing.
- Define and/or understand the implications of data structure, including the concepts of:
  - o Data validation
  - o Record, field, character, array
  - o Database management systems
- Define basic IT concepts such as:
  - Batch processing
  - o Real-time processing
  - Distributed processing
  - Physical access controls
  - Modification controls
- Recognize basic security controls.
- Identify basic data validation or editing techniques.

Group D – Disaster recovery and business continuity, including data backup and data recovery procedures, alternate processing facilities (hot sites), and threats and risk management

The candidate should be able to:

- Identify the advantages of disaster recovery and business continuity.
- Determine the basic steps to develop a disaster recovery plan.
- Identify the major players involved in a disaster recovery plan.

Group E – Financial statement and business implications of electronic commerce, including electronic fund transfers, point of sale transactions, Internet-based transactions and electronic data interchange

- Identify factors to consider in the decision process related to electronic commerce applications.
- Identify and resolve authorization issues associated with electronic data interchange in a business information system.
- Identify and evaluate risks, limitations, and advantages of electronic commerce applications.

### **Area V – Planning and measurement (22%-28%)**

### Group A – Planning and budgeting

The candidate should be able to:

- Define strategic and operational planning.
- Identify various types of short- and long-term budgeting techniques and/or formats.
- Identify forecasting and projection methods and perform calculations.
- Understand and apply regression analysis.
- Determine what type of budget technique or format is appropriate given certain facts and circumstances.
- Differentiate between operating and capital budgeting and budget formats, such as flexible budgeting.
- Identify and calculate the components of a master budget.
- Calculate the effect of depreciation in operating and capital budgeting.
- Define, calculate, and explain budget variances.
- Perform cost-profit-volume analysis.

### <u>Group B – Performance measures</u>

The candidate should be able to:

- Identify the appropriate analytical tool in given circumstances.
- Define and or/calculate:
  - o Financial ratio analysis
  - o Price elasticity analysis
  - Target market analysis
- Define and determine appropriate circumstances for using performance measures such as:
  - o Benchmarking
  - o Total quality management
  - o Balanced scorecard
  - o Economic value added

### Group C – Cost measurement

- Calculate gross profit margin.
- Define, identify, and/or calculate:
  - o Fixed costs
  - Variable costs
  - Controllable costs
  - Sunk costs
  - Accounting costs
  - Opportunity costs
  - Standard cost variances
  - Regression analysis

- Identify, recognize and determine the effects of various inventory systems, such as just-in-time, including:
  - o Advantages and disadvantages
  - Types of inventory techniques/innovations
  - Effect of specific inventory techniques/innovations on production costs in selected circumstances
- Identify and apply cost estimation and cost determination, especially through the use of cost drivers.
- Differentiate between cost-volume-profit analysis, target costing, and transfer pricing.
- Define and differentiate among job costing, process costing, and activity-based costing.
- Define and calculate joint and by-product costing, variable and absorption costing.

## **III - Typical References**

References for this section include AICPA Audit Risk Alerts and current textbooks on business law, managerial accounting, management, finance, economics, accounting and management information systems, and budgeting and measurement. Business periodicals provide background material that is helpful in gaining an understanding of business environment and concepts.

Listed below are textbooks that are typical references. This list was compiled from a search of current top-selling textbooks. It is not comprehensive. The inclusion of a textbook on this list is not an endorsement by the AICPA.

### **Business Law**

Business Law, 5th edition by Cheeseman, Pearson Education (2003)

Business Law: Principles for Today's Commercial Environment by Twomey and Jennings, South-Western College Pub. (2003)

Law for Business Studies Students, 3rd edition by Owens Cavendish Publishing, (2001)

Smith and Roberson's Business Law, 12th edition by Mann, Roberts, Young, Smith South-Western College Pub. (2002)

West's Business Law: Text and Cases, 9th edition by Clarkson, Miller, Jentz, Cross South-Western College Publications (2003)

# **Economic Concepts**

Economics, 15th edition by McConnell, Brue McGraw-Hill (2001)

Economics Principles and Tools, 3rd edition by O'Sullivan, Sheffrin, Prentice Hall (2002)

Financial Accounting: In an Economic Context, 5th edition by Pratt John Wiley & Sons (2002)

Managerial Economics, 5th Edition by Mansfield, Allen, Doherty, Weigelt W.W. Norton & Company (2002)

Managerial Economics: Applications, Strategy and Tactics, 9th edition by McGuigan, Moyer, Harris, South-Western College Pub. (2001)

Managerial Economics, 4th edition by Samuelson, Marks, John Wiley & Sons (2002)

# **Financial Management**

Corporate Finance, 6th edition by Stephen A. Ross, Randolph Westerfield, Jeffrey F. Jaffe, Bradford Jordan McGraw-Hill (2003)

Financial Management and Policy, 12th Edition by James C. Van Horne Prentice Hall (2001)

Financial Management: Principles and Applications, 9th Edition by Arthur J. Keown, John W. Martin, William D. Petty, David F. Scott Prentice Hall (2001)

Foundations of Financial Management, 10th Edition by Stanley B. Block, Geoffrey A. Hirt McGraw-Hill/Irwin (2002)

Fundamentals of Financial Management, 3rd edition by Eugene F. Brigham, Joel F. Houston South-Western College Pub. (2001)

Principles of Corporate Finance, 7th edition by Richard A. Brealey, Richard Brealey, Stewart Myers McGraw-Hill/Irwin (2003)

### **Information Technology**

Accounting Information Systems, 9th edition by Marshall B. Romney, Paul John Steinbart Prentice Hall (2002)

Accounting Information Systems, 5th edition by Ulric J., Jr. Gelinas, Steve G. Sutton, Allan E. Oram South-Western College Pub. (2001)

Accounting Information Systems: A Business Process Approach, 1st edition by Frederick Jones, Dasaratha V. Rama South-Western College Pub; (2002)

Core Concepts of Accounting Information Systems, 8th edition by Stephen A. Moscove, Mark G. Simkin, Nancy A. Bagranoff John Wiley & Sons (2002)

Information Technology for Management: Transforming Business in the Digital Economy, 3rd edition

by Efraim Turban, Ephraim McLean, James Wetherbe John Wiley & Sons (2001)

Management Information Systems, 8th edition By Laudon, Laudon Pearson Education (2003)

# Planning and measurement

Cost Accounting: A Comprehensive Guide, 1st edition by Steven M. Bragg John Wiley & Sons (2001)

Cost Management: A Strategic Emphasis, 2nd edition by Edward J. Blocher, Kung H. Chen, Thomas W. Lin McGraw-Hill/Irwin (2001)

Cost Accounting: A Managerial Emphasis, 11th Edition by Charles T. Horngren, Srikant M. Datar, George Foster Prentice Hall College Div. (2002)

Financial & Managerial Accounting: A Basis for Business Decisions, 12th edition by Jan Williams, Sue Haka, Mark S. Bettner, Robert Meigs McGraw-Hill/Irwin (2002)

Managerial Accounting, 10th Edition by Ray H. Garrison, Eric W., Phd McGraw-Hill/Irwin (2002)

Managerial Accounting: Creating Value in a Dynamic Business Environment, 5th edition by Ronald W. Hilton McGraw-Hill/Irwin (2001)

### **IV - Sample Questions**

The following are samples of the types of multiple-choice questions that will appear on future examinations (Note: these specific questions will not be used on future examinations).

### \* - Suggested answer

- 1. Which of the following statements concerning the similarities between a general partnership and a corporation is correct?
  - A. Corporate stockholders and general partners have limited personal liability.
  - B. Corporations and general partnerships have perpetual existence.
  - C. Corporations and general partnerships can declare bankruptcy. \*
  - D. Corporations and general partnerships are recognized as taxpayers for federal income tax purposes.
- 2. Furl Corp., a corporation organized under the laws of State X, sued Row, a customer residing in State Y, for nonpayment for goods sold. Row attempted to dismiss a suit brought by Furl in State Y, on the grounds that Furl was conducting business in State Y but had not obtained a certificate of authority from State Y to transact business therein. Which of the following actions by Furl would generally result in the court ruling that Furl was conducting business in State Y?
  - A. Maintaining bank accounts in State Y.
  - B. Shipping goods across state lines into State Y.
  - C. Owning and operating a small manufacturing plant in State Y.\*
  - D. Holding board of directors meetings in State Y.
- 3. In which of the following situations would there be inelastic demand?
  - A. A 5 percent price increase results in a 3 percent decrease in the quantity demanded. \*
  - B. A 4 percent price increase results in a 6 percent decrease in the quantity demanded.
  - C. A 4 percent price increase results in a 4 percent decrease in the quantity demanded.
  - D. A 3 percent price decrease results in a 5 percent increase in the quantity demanded.
- 4. A project should be accepted if the present value of cash flows from the project is
  - A. Equal to the initial investment.
  - B. Less than the initial investment.
  - C. Greater than the initial investment. \*
  - D. Equal to zero.
- 5. Which of the following cash management techniques focuses on cash disbursements?
  - A. Lockbox system.
  - B. Zero-balance account.\*
  - C. Preauthorized checks.
  - D. Depository transfer checks.

- 6. A customer intended to order 100 units of product Z96014, but incorrectly ordered nonexistent product Z96015. Which of the following controls most likely would detect this error?
  - A. Check digit verification.\*
  - B. Record count.
  - C. Hash total.
  - D. Redundant data check.
- 7. The greatest financial threat to an organization that implemented the financial accounting module of an enterprise resource planning (ERP) system from a major vendor exists from errors detected during which of the following times?
  - A. Project initiation.
  - B. Requirements determination.
  - C. Table configuration.
  - D. Implementation.\*
- 8. Which of the following procedures would an entity **most** likely include in its disaster recovery plan?
  - A. Convert all data from EDI format to an internal company format.
  - B. Maintain a Trojan horse program to prevent illicit activity.
  - C. Develop an auxiliary power supply to provide uninterrupted electricity.
  - D. Store duplicate copies of files in a location away from the computer center. \*
- 9. Which of the following definitions best characterizes benchmarking?
  - A. A technique that examines product and process attributes to identify areas for improvements.
  - B. The comparison of existing activities with the best levels of performance in other, similar organizations. \*
  - C. The development of the most effective methods of completing tasks in a particular industry.
  - D. The complete redesign of a process within an organization.
- 10. Which of the following is true about activity-based costing?
  - A. It should **not** be used with process or job costing.
  - B. It can be used only with process costing.
  - C. It can be used only with job costing.
  - D. It can be used with either process or job costing.\*